

ABSTRACT

An internal combustion engine is described having a valve mechanism which comprises a gas exchange poppet valve, a camshaft rotatable in synchronism with the engine crankshaft and having a cam for operating the valve, a valve actuator acting on the poppet valve to open and close the valve, and an intermediate rocker having a follower acted upon by the cam and a contoured surface that acts on the valve actuator to open and close the valve in synchronism with the rotation of the cam, the intermediate rocker having a pivot axis that is movable in order to vary the valve lift. In the invention, the intermediate rocker is mounted about a pivot shaft that is moved to vary the valve lift in response to rotation of the pivot shaft about its own axis, and the pivot shaft is constrained to move along a path which is such that, while the cam follower is on the base circle of the cam, the valve actuator remains stationary and a substantially constant clearance is maintained between the contoured surface of the intermediate rocker and the valve actuator during displacement of the pivot shaft along the path.